

“It is with great pleasure that I send you notes on the differences that I can make out between *P. obscura* and *P. viridis*. They are quite distinct. The names of the colours in the appended diagnoses are taken from Ridgway’s ‘Nomenclature’ :—

“PS. OBSCURA.

Upper parts blackish, mixed with dark blue-green.

Larger coverts with a dark plum-purple gloss at the ends.

Secondaries blackish brown.

Scale-like feathers on the fore-neck with a dusky plum-purple gloss.

Bill and legs in the stuffed specimens blackish.

PS. VIRIDIS.

Upper parts brownish, varying to bright parrot-green or grass-green.

Purple gloss of larger wing-coverts more expanded, brighter, more bluish, varying to green.

Secondaries clearer, chocolate-brown.

Scale-like feathers on the fore-neck brighter, more glossy, prune- or dahlia-purple.

Bill and legs in the stuffed specimens lighter, brownish.”

After this I think it will be allowed that *P. obscura*, although closely allied to *P. viridis*, and belonging to the same section of the genus, is specifically distinct, as might be expected from the different localities of the two species—*P. obscura* being from Lower Amazonia, and *P. viridis* from the far interior valley of the Rio Madeira.

[Since this article was written two living examples of *P. obscura* have been acquired by the Zoological Society of London, and are now in the Western Aviary. I have compared them with the specimen now figured, and find that they agree in every essential particular.—P. L. S., 9. vii. 98.]

XLV.—*Field-notes on the Land-birds of Sabaragamuwa Province, Ceylon.*—Part II. By FREDERICK LEWIS, A.C.F. Ceylon, F.L.S.

[Concluded from p. 356.]

70. CORONE MACRORHYNCHA (Legge, B. of C. p. 346).

An abundant species in the province, and generally distributed up to 3000 feet altitude, but after that it becomes

scarce and is only occasionally found. In the dry zone it is not quite so common as in the moister parts of Sabaragamuwa, but as it to a great extent follows man, its seeming decrease of numbers is possibly in proportion to sparse peopling of the "Bintenna" country.

It nests in tall high trees, often selecting the highest branches of cotton-trees on which to build its loosely-constructed nest. As already stated, the true Indian Koel deposits its eggs in the nest of this Crow, and it is noticeable that whenever the opportunity occurs the Black Crow never ceases to persecute the Koel, which it naturally regards as its enemy.

This species quite takes the place of *C. splendens*, so common on the Western-Province coast.

71. *CISSA ORNATA* (Legge, B. of C. p. 353, pl. xv.).

This handsome Jay is peculiar to Ceylon, and its distribution in the province is somewhat remarkable. I have met with it at the highest altitudes, and again at the foot of the hills on the confines of the dry zone. Even in so wet a district as Bamberabolowa, at the foot of the Peak range, I have found it common and nesting. Again, on the outlying range of hills that jut out into the plains from Rukwana I have obtained it, but the limit appears to be bounded more by the rainfall than by altitude, as I have found it nesting at 1500 feet and at 4500 feet above the sea.

The nest is a large roughly-built structure, made of small sticks and twigs, with a fairly large depression in the middle, with little or no "lining." I obtained three eggs in December, of a pale bluish ground-colour, with spots, blotches, and streaks of umber-brown, that fades into the ground-colour in places, so as to give a brownish-blue tint.

72. *ORIOLOUS MELANOCEPHALUS* (Legge, B. of C. p. 357).

A common bird in the province, but more abundant in drier parts of it than in the wet. I have obtained examples up to 3000 feet, but have not seen it above that altitude.

73. *GRAUCALUS MACII* (Legge, B. of C. p. 360).

Generally confined to the low country, where the rainfall is moderate, but it is not always so restricted. I have obtained it at Balangoda (1700 feet) and the country eastward, and again at Yatiyantota, in the valley of the Kalani river, and frequently in the Kégalla district, where it is fairly common.

74. *PERICROCOTUS FLAMMEUS* (Legge, B. of C. p. 363).

This beautiful Minivet is widely distributed in the province, ascending to the Horton Plains, but it is not to be regarded as particularly common, especially as in the south-west monsoon it becomes scarce. In the Balangoda country I found it plentiful in the high forests, but as the country to the east is now open, it was noticeable that these Minivets were more to be found to the westward than to the eastward. They are by no means uncommon in the high forests at the Horton Plains.

75. *PERICROCOTUS PEREGRINUS* (Legge, B. of C. p. 366).

Moderately abundant, but I have only found it in the open dry country to the east of the province.

76. *LALAGE SYKESI* (Legge, B. of C. p. 369).

Chiefly confined to the low country up to 2000 feet, but I fully endorse Major Legge's statement that it "is neither common nor abundant."

77. *HEMIPUS PICATUS* (Legge, B. of C. p. 375).

Chiefly confined to the hills in the moist zone, where it is found on the confines of the forest and on the edges of the semi-cultivated chen- and patina-lands.

78. *LANIUS CRISTATUS* (Legge, B. of C. p. 377).

A migratory species, arriving early in the north-east monsoon and spreading all over the open parts of the province, both in the wet and dry zones, but I have rarely met with it in heavy forest.

79. *BUCHANGA LEUCOPYGIALIS* (Legge, B. of C. p. 392, pl. xvi.).

A common species, mostly confined to the wet zone and

to the more open parts of the country (except grass-lands) up to 4000 feet, at which elevation it becomes rare. I have found it in great abundance throughout the Kegalla district, till the large wet forests of the Adam's Peak range are met with, when it becomes scarce. I have obtained its eggs in Balangoda (2000 ft.), Mawanella, in Kégalla (400 ft.), and at Ratnapura (100 ft.).

Endemic.

80. *DISSEMURUS LOPHORHINUS* (Legge, B. of C. p. 396, pl. xvii. fig. 2).

A strictly forest species, with a rather extended range of distribution in the province. I have obtained it nesting in forest on the banks of the Hulanda Oya stream in the dry zone, and again in the wet forest below Meriacotta Peak at an altitude of nearly 5000 feet.

In all the forests along the base of the main zone of hills dividing the Sabaragamuwa Province from the Central Province I have found this species, and in the dense wild country extending from the Kukulu Korah over into the Colombo district. I might add that a very noticeable habit with this fine Drongo is its frequently consorting with the noisy little parties of *Malacocerci*; in fact, if a party of these are out feeding, one is almost certain to find a pair of Drongos following them, but I have never observed them to be on other than most friendly terms.

Endemic.

81. *DISSEMURUS PARADISEUS* (Legge, B. of C. p. 399, pl. xvii. fig. 1).

I have only met with this handsome Drongo in the dry forests of the Nuda Korah and at Timbolkettia, on the road from Hambantotta to Pelmadulla; in fact, it seems at about this point to take up the same position that the preceding species leaves off.

82. *TERPSIPHONE PARADISI* (Legge, B. of C. p. 404).

A partially migratory bird, found in its greatest abundance during the N.E. monsoon months, when its distribution extends from the plains of the low country up to 5000 feet, but

after 3000 feet altitude is passed this Flycatcher is only a rare visitor. The various phases of plumage of this bird have been the subject of much discussion, some naturalists contending that birds in the red stage are of one species while those in white are distinct, citing in support of this argument that the natives of the country call this bird by two distinct names. The natives of Ceylon are not, however, strict observers of bird-life, and though some of their names are apt as regards their signification, they are frequently misleading. In this case, in the red stage, the Paradise Flycatcher is called by the Singalese "Ginne horà," meaning literally "Fire-thief" (*ginne* = fire, and *horà* = a thief), while in its white dress it is called the "Reddà hora," or "Cotton-thief" (*reddà* = a cloth—usually implying a white cloth). These names are clearly taken from the pretty way in which these birds flick their long tail-feathers when flying from bush to bush or tree to tree, giving a fanciful resemblance to a burning coal or bit of white cloth being whisked about.

If there is any doubt on the point still left, I may add that I found a Paradise Flycatcher in the compound of the District Engineer's house at Ratnapura.

I obtained a nest placed in the low fork of a small tree in thick forest. The nest was delicately constructed, deeply cup-shaped, and covered on the outside with mosses and lined inside with hair. Eggs three in number, of a delicate pink ground-colour, thickly freckled with red-brown spots.

83. *HYPOTHYMIS CEYLONENSIS* (Legge, B. of C. p. 408, pl. xviii. fig. 2).

Indigenous to Ceylon. The distribution of this Flycatcher does not appear to have been sufficiently followed, for I note that Legge says, "not ranging much above the low hill-districts," adding that he had seen it between 2000 and 3000 feet in the low country to the N.E. of Kandy.

My own observations give it a much wider range, for I have procured it at 5000 feet in the cold wet forests east of Adam's Peak. I found it fairly common in all the Balangoda and Bamberabolowa country, and from thence

right down to the dry forests at the foot of the Rukwana hills, and again in the thorny scrub-lands at Liyangaha Ela, in the driest part of Sabaragamuwa. The colouring of the bird varies in its intensity of blue with the rainfall of the country it inhabits: thus, the birds I have procured in the cold wet hill-forests are many shades darker than specimens obtained in the plains.

84. *CULICICAPA CEYLONENSIS* (Legge, B. of C. p. 410).

A common species, but chiefly confined to the upper hills. I have found it all through the Peak forests and onward to the Horton Plains, and again in the Rukwana hills, but rarely below 2000 feet and never in the dry forests.

I procured the nest and eggs in the Bogawantalawa district, the former being placed in a crevice of a banyan-tree, and most beautifully concealed by moss. The eggs were three in number, dull yellowish white, with the broad end spotted and blotched with purplish brown, ending in freckles.

85. *RHIPIDURA ALBIFRONTATA* (Legge, B. of C. p. 412).

I have obtained this very beautiful little Fantail-Flycatcher only in the dry zone on the edge of the Uva Province and the wild bush-country.

86. *ALSEONAX LATIROSTRIS* (Legge, B. of C. p. 415).

A migratory species, arriving early in the north-east monsoon and spreading over the province to a high altitude, but chiefly confining itself to the moist districts.

87. *ALSEONAX MUTTUI* (Legge, B. of C. p. 417, pl. xviii. fig. 1).

I have obtained this little indigenous Flycatcher in Balan-goda, and again in the wet forests on the west of the province and at the foot of Adam's Peak. It might easily be mistaken for *A. latirostris*, except that it is much more rusty brown in colour.

88. *STOPAROLA SORDIDA* (Legge, B. of C. p. 419, pl. xviii. fig. 3).

An indigenous and mountain species and commonly found.

The lowest level at which I have seen it is in the valley of the Wallaway river. I have obtained several nests, frequently in mossy banks and in moss-covered rocks, and also in old dead tree-stumps. The eggs are from three to four in number, of a pale, soft, white ground-colour, splashed and speckled with dull red.

89. *SIPHIA TICKELLIÆ* (Legge, B. of C. p. 421).

Fairly common throughout the moister parts of the province and ascending to about 3000 feet. It is frequently to be met with in the native gardens, especially so about the town of Kegalla. In the forests round the Adam's Peak mountain it frequently occurs, as also in the forests of the Rukwana district.

90. *MUSCICAPA HYPERYTHRA* (Legge, B. of C. p. 428).

A migratory species, arriving with the N.E. monsoon and rapidly spreading over the hill-districts of the province.

Its distribution is somewhat curious for a migrant, as it is rarely found below 2000 feet; but in order to become suddenly plentiful, as it does, at high altitudes, it must clearly pass over a long space of wooded country, hundreds, if not thousands, of feet below its altitude of flight during migration. Equally its departure must be from a high level, as it disappears as suddenly as it arrives; while again, as noticed by Legge, it often deserts places where, during previous seasons, it was an abundant visitor.

91. *PRATINCOLA BICOLOR* (Legge, B. of C. p. 430).

A resident hill-species, and, so far as the distribution in Sabaragamuwa goes, found only on the Horton Plains and on the grass-covered hills above Galagama. It quite takes the place in the mountain-plains of the succeeding species, and may be regarded as plentiful.

I obtained a nest from a hollow in an old rhododendron-tree with one egg, of a soft faint green colour, closely mottled and streaked with red-brown, forming almost a cap on the broad end.

92. *COPSYCHUS SAULARIS* (Legge, B. of C. p. 433).

Common all through the province up to 4000 feet, but it must not be regarded as a forest-species purely, as it is more frequently found round the haunts of man than elsewhere. It is well known both to the Tamils and the Singalese; thus, among the former, the "Magpie-Robin" is called the "Karrichan Koroovic" (or "Charcoal-bird"), while, from its frequency among the coconut-gardens of the country, it gets the name of "Pollitcha" with the Singalese. It is one of our sweetest songsters, yet, notwithstanding, it is seldom caged.

93. *CITTOCINCLA MACRURA* (Legge, B. of C. p. 437).

Chiefly confined to the dry zone, where it is abundantly found in all the thorny forests. It ascends in the eastern half of the province up to Belihuloya and round the foot of the hills towards Haputela.

94. *THAMNOBIA FULICATA* (Legge, B. of C. p. 440).

Very common in all the dry parts of the province and intermediate region; thus it occurs in the whole of the Kegalla district, the lower part of the Rukwana hills, and Balangoda up to 1600 feet.

I have obtained a nest at 1400 feet with eggs; these are generally two in number, of a greenish-white ground-colour, thickly spotted and blotched over the broad end with dull brownish red varied with greyish brown.

95. *LARVIVORA BRUNNEA* (Legge, B. of C. p. 446).

A migrant, arriving with the N.E. monsoon. I have only met with it occasionally at 4000 feet altitude.

96. *TURDUS KINNISI* (Legge, B. of C. p. 449).

A permanent resident, confined to the hill-country. It is fairly abundant in the forests above 4000 feet, and often visits the ornamental trees that are planted round the houses in tea-gardens, thus reminding one of the English Blackbird. I have found it once as low as 2000 feet in the neighbourhood of a high range of hills, but it is unusual to find it so low. It breeds in the higher tea-districts of Bogawantalawa and

Upper Dimbula, in the Central Province. The eggs are large in size, being over 1 inch by about $\frac{8}{10}$, pale soft green with blotchings of light umber or greyish red, with an intermingling of fine spots of the latter tint.

Murray gives this bird as indigenous to Ceylon, but it may be found to be identical with the larger Nilghiri species, *T. similimus*.

97. *TURDUS SPILOPTERUS* (Legge, B. of C. p. 451, pl. xix.).

This beautiful Thrush is peculiar to Ceylon and has a wide distribution in Sabaragamuwa. It is to be found in the wet forests at 100 feet, and again up at the Horton-Plain forests (7000 ft.), while in some of the deep forests of the dry zone it may be met with; but there is some considerable variation in colour between the birds of the two extreme limits of rainfall, the darker forms always indicating a wet district. I have obtained several nests, but in all cases in short, low trees, quite close to the ground. The eggs number two, of a light pale bluish ground, much speckled and dotted with dull red or light salmon.

98. *TURDUS WARDI* (Legge, B. of C. p. 453).

I have only once met with this Thrush in Sabaragamuwa, and then under rather unusual conditions. I was on my way to Denagama, in the Kadawatta Korah, in a country where grass-lands are abundant, with here and there patches of dense forest. On going through one of the latter I was attracted by a short twitter-like note that I found came from this unmistakable Pied Blackbird, and soon I found that I was in a regular little flock of some 20 or more birds. I have frequently revisited the spot, but have never obtained fresh examples.

99. *OREOCINCLA IMBRICATA* (Legge, B. of C. p. 455).

A very rare indigenous Thrush. I have only three times obtained it: once on the ridge dividing Central and Sabaragamuwa Provinces at 5000 feet, a second time in the rocky forests above the Boltumbe district, and once in the Pusselawa district in the Central Province.

100. *Monticola cyanus* (Legge, B. of C. p. 460).

I have only once obtained this bird among a mass of rocks in the Balangoda district during the N.E. monsoon.

101. *Myiophonus blighi* (Legge, B. of C. p. 463, pl. xx.).

This large and beautiful Thrush is chiefly confined to the hill-country, and does not appear to be particularly plentiful. From my own observations it does not occur below 3000 feet. I procured it twice above 4000 feet in the Morahella forest, and again below the Meriacotta Peak, near Maskeliye. I have seen it in the Gillimali forests and three times on the Central-Province side of Adam's Peak. Its shy habits may have something to do with its not being more frequently seen; and, as it appears to confine itself to dark forests and streams abounding with rocks, it is all the more difficult to study.

I strongly suspect the existence of an allied form in Ceylon, as I once had an opportunity of watching a pair of birds in the wet forests of Gillimali which, while closely resembling this species, could yet be distinguished by the shorter tail and much browner shade, with a smoke-black head. Unfortunately, at the time I was without my gun, so that I can only record the above as being a possible "find," that may fall to the luck of other ornithologists to place on record.

I may add that I procured a hen bird with much duller markings than the male, and with a bright blue patch on the interscapulars.

102. *Hypsipetes ganeesa* (Legge, B. of C. p. 469).

A very abundant species and found throughout both districts of the province. It is frequently met with in flocks, affecting forests on the edges of patina- and chena-lands and on the wild slopes of Raja Singha forest, towards the south. It breeds in February and March in rather high trees, constructing a loose nest, like the others of the Bulbui tribe. In the Kegalla district, where forest is less plentiful than in the interior of the province, these birds select solitary "kahata" trees (*Careya arborea*) to build in. The eggs are

two in number, of a delicate lavender-white ground-colour, thickly speckled and dotted with dull red spots.

103. *CRINIGER ICTERICUS* (Legge, B. of C. p. 472).

A very common forest-loving bird and widely distributed in the province, but less common at extreme altitudes than in the intermediate districts, where the rainfall is more moderate. I have obtained its eggs only once, in April. The nest was of the typical Bulbul form and placed within a short distance of the ground. The eggs were two in number, and pure white.

104. *IXOS LUTEOLUS* (Legge, B. of C. p. 475).

One of our commonest birds, and locally known as the "Cinnamon-Thrush," probably because it is a familiar form in the "cinnamon" gardens around Colombo. It is generally distributed over the bush-country as far up as 3500 feet, but is rarely met with in the deep wet forests of the province. It breeds towards the end of the year and just before the burst of the S.W. monsoon, constructing its nest in bushes and low trees. The eggs are often four in number, of a dull white ground-colour, thickly spotted and splashed with dull red, often of a purplish tinge.

105. *RUBIGULA MELANICTERA* (Legge, B. of C. p. 476, pl. xx. fig. 1).

An indigenous species. It is chiefly confined to the wet forests, ascending up into the hill-country to an altitude of 4000 feet towards the base of the Adam's Peak range. I have found it particularly common about Balangoda (2000 feet) and in the very wet forests in the neighbourhood of Kittulgalla. It breeds in March and April. The nest is in the usual small cup-shaped form, of loose construction, placed a few feet from the ground, containing two or three eggs of a dull white colour, spotted and blotched with dull red varied with a bluish marking.

106. *KELAARTIA PENICILLATA* (Legge, B. of C. p. 480, pl. xxi. fig. 1.)

A very beautiful Hill-Bulbul, confined for the most part

to altitudes above 4000 feet. I have frequently obtained it at the Horton Plains (7000 feet), and at Morahella (4000 feet), where it is abundant. The lowest altitude at which I have found this bird was at Massena, in the Pettiagalla range of hills, at 2600 feet.

The nest is as like that of any of the foregoing species as possible, and constructed in the same loose manner. The eggs are two in number, rather stout ovals, of a dull purplish ground-colour, very closely freckled and splashed with red-brown or warm brown spots and markings.

107. *PYCNONOTUS HÆMORRHOUS* (Legge, B. of C. p. 482).

This is the common "Madras Bulbul," and to be found all over the province up to 4000 feet, but not in forests. It is frequently caged by the natives and kept as a domestic pet.

It breeds in the most unprotected places, often selecting a sun-flower (*Hibiscus*) hedge as the location for its rudely-built nest. The early part of the year is generally the season for nidification, and it is noticeable that at this period the cock birds become extremely pugnacious, and native children often amuse themselves in setting caged Buleuls to fight. The eggs are three, and often four, in number, of a pale reddish-white ground-colour, closely mottled with spots and blotches, that at the broad end form a complete zone of marking round the egg. I have remarked that the eggs of this species are paler at lower and drier altitudes than those obtained in very wet districts.

108. *PHYLLOSCOPUS JERDONI* (Legge, B. of C. p. 485).

A common bird, but rarely seen, owing to its uniform green colouring, which so closely matches the foliage of the trees it frequents that it is not readily distinguishable. I have met with it up to the base of the Galagama hills (4000 feet), but it appears to be more plentiful in thinly-wooded lands between Ratnapura and Mahawellatenna (from 200 to 2000 feet).

109. *IORA TYPHIA* (Legge, B. of C. p. 490).

This very beautiful little Bulbul is abundant throughout the province up to about 3000 feet, and for the most part

affects the "chena"-lands, though it is not unfrequently found in forests. I have repeatedly obtained it in native gardens, where it loves to infest mango-trees. Its beautiful prolonged whistle is very striking, and it may be added that the bird appears to have a sort of ventriloquistic power, as I have frequently remarked that when the bird was close at hand its call appeared to come from quite an opposite direction.

I have not myself taken the eggs, but I have been shown specimens obtained in the North of Ceylon. They were of a grey-white, lightly and sparingly marked with pale brown spots.

110. *MALACOCERCUS STRICTUS* (Legge, B. of C. p. 494).

A typical low-country bird, and commonly known as the "Suru Sistus," or Dung-Thrush. It is confined chiefly to open country, and, so far as I am aware, is never found in forests. It breeds in March and April, placing its nest in low bushes. The eggs are usually three in number, of a beautiful greenish-blue colour, and look as if highly polished.

111. *MALACOCERCUS RUFESCENS* (Legge, B. of C. p. 497, pl. xxi. fig. 2).

A common forest species, very much like *M. strictus* in its habits, but distinct as regards its selection of forest and bush country instead of the inhabited places and gardens frequented by the former.

I have found it in the wet forests of the Adam's Peak range up to 4000 feet, and again on the borders of the Galle district and in the Kukul Korah. Like the last, it is gregarious, and it is noticeable that when parties of these birds are found, they are most frequently to be seen followed by the large Suberested Drongo (*Dissemurus lophorhinus*), which I have no doubt makes use of them for unearthing grubs and worms that the Drongo snatches away. I have not taken the eggs of this indigenous bird.

112. *GARRULAX CINEREIFRONS* (Legge, B. of C. p. 499, pl. xxii. fig. 2).

Not uncommon, but restricted to the forests. I have

obtained it in the Peak forests up to 5000 feet, and in the forests of the Lower Bulatgama, the Kuruwiti Korah forests, and on the borders of the Western Province. I have not met with it in any of the dry forests in the east, but it probably occurs at the base of the Rukwana hills.

Like the two foregoing it is gregarious, feeding in flocks of as many as 15 or 20 birds. It is shy, and when alarmed I do not know a more noisy bird for its size. I have not obtained nest or eggs. Indigenous.

113. *POMATORHINUS MELANURUS* (Legge, B. of C. pl. xxii. fig. 1).

A widely-distributed forest-bird, and found in nearly all the wet forests of the province up to the highest hills. It occurs in the dry-zone forests, but more towards the interior than eastward.

This Ant-Thrush builds in the beginning of the year, selecting mossy banks for building the nest in. The eggs vary in number from two to five, and are pure white in colour, very delicate. Indigenous.

114. *DUMETIA ALBOGULARIS* (Legge, B. of C. p. 505).

Not an uncommon bird in the Sabaragamuwa Province, but curiously distributed. It is found in the grassy country to the north-east, and extends up to 3000 feet, preferring bush-lands and reedy swamps.

115. *ALCIPPE NIGRIFRONS* (Legge, B. of C. p. 507, pl. xxiii. figs. 1, 2).

A common species and widely distributed, but chiefly confined to the wet forests. I have found it in the dry plains as well, but not in abundance.

It builds in bamboo-jungle, and I am inclined to think constructs a number of nests, adopting only one for breeding purposes. The eggs are laid generally from January to March, two, and occasionally three, in number, of a soft white ground-colour, widely spotted over with red-brown dots. In shape the eggs are distinctly "stumpy," being only a little longer than broad. Indigenous.

116. PELLORNEUM FUSCICAPILLUM (Legge, B. of C. p. 509, pl. xxiii. fig. 3).

A common little bird, but owing to its habits rarely seen. I have obtained specimens at 4000 feet, and observed it in the wet forests and waste land on the confines of the north-west. It builds a nest much like that of *Alcippe nigrifrons*, selecting a low bush for the situation. The eggs are two in number, pale soft white and dotted over with brownish-red spots, rather sparingly scattered. Indigenous.

117. PYCTORHIS NASALIS (Legge, B. of C. p. 512, pl. xxiv. fig. 1).

Not uncommon in swampy lands and abandoned paddi-fields. I have procured it in the grass-lands of the Balangoda district, but have not observed it at higher altitudes than 2500 feet. Indigenous.

118. ELAPHRORNIS PALLISERI (Legge, B. of C. p. 514, pl. xxiv. fig. 2).

I have obtained this bird only in the "patina"-lands of the Horton Plains at 7000 feet, and in a similar grassy land on the Central-Province side of the dividing range. Peculiar to Ceylon.

119. ORTHOTOMUS SUTORIUS (Legge, B. of C. p. 517).

Very common up to 6000 feet.

It breeds in March and on to about November, using generally some broad-leaved plant for its nest to be built in. I have found the nest constructed out of a single leaf of an ornamental caladium, and again out of a number of leaves of the common *Trema orientalis*, and often in cinchona-leaves. The beautiful structure of the nest is too well known to need description here, but I may say that I believe the statement made by the natives that a firefly is often found stuck with mud as a sort of lamp to illuminate the nest is purely an invention, as I have had frequent opportunities of watching the habits of the Tailor-bird and never found indications of fireflies or of mud. The eggs are three or four in number, of a pale greenish-white ground-colour, faintly washed with splashes of dull red, often forming broad patches

of colour. The colours fade rapidly, and so fresh eggs unblown look very different from those that have been collected for some time.

120. *PRINIA SOCIALIS* (Legge, B. of C. p. 520).

Not uncommon up to 4000 feet. It is often met with in grass-fields and paddy-lands, and not unfrequently in patina-lands.

I have obtained the eggs from a high altitude in a grass-land. They were of a fine terra-cotta colour and very glossy. The breeding-season is generally about the beginning of the S.W. monsoon.

121. *DRYMÆCA VALIDA* (Legge, B. of C. p. 525, pl. xxv. fig. 2).

A widely-distributed species, affecting the grass-lands of the province at low altitudes. I have found it in swampy lands about Kukulū Korah, the Kuruwiti Korah, and in the drier country towards the North-western Province.

122. *DRYMÆCA INSULARIS* (Legge, B. of C. p. 529, pl. xxv. fig. 1).

Fairly common in grass-lands and swampy or reedy lands in the province. I have obtained specimens at 3000 feet in the eastern parts of the country towards Uva, and again in the dry zone, where, however, it does not appear to be abundant. It breeds in grass-lands through the greater part of the year, laying four eggs, which are of a beautiful glossy blue, with large blots and blotches of red-brown.

123. *CISTICOLA CURSITANS* (Legge, B. of C. p. 531).

This little Grass-Warbler has about the widest distribution of any bird in the province, being equally common from the tank-country in the dry zone to the cold bleak plains at 7000 feet. It breeds equally at all altitudes, and, I think, twice a year, as its nest may be found in May as well as November. The nest is a beautiful structure, placed close to the ground, and contains three or four eggs, of a white ground-colour faintly tinged with very pale green and dotted with brown spots, that are more or less "zoned" at the broad end.

124. *ACROCEPHALUS DUMETORUM* (Legge, B. of C. p. 545).

A rare migrant. I include it with some hesitation, but I have obtained a specimen in the north-east of the province that I think can belong to no other species.

125. *LOCUSTELLA CERTHIOLA* (Legge, B. of C. p. 548).

I have on three or four occasions met with this bird, and each time in very dense grass-lands or thorny thickets. Its habits are most difficult to watch, owing to its resorting to such impenetrable places and its extreme shyness. It is a winter visitor, arriving at the beginning of the N.E. monsoon.

126. *PHYLLOSCOPUS NITIDUS* (Legge, B. of C. p. 551).

A winter visitor to the country. It ascends to high altitudes during its stay in the country, and inhabits both gardens and plantations alike. At certain seasons, or, I should say, in certain years, it is far more plentiful than at other times, so as to be regarded as absolutely common, and again scarce in other years.

127. *PHYLLOSCOPUS MAGNIROSTRIS* (Legge, B. of C. p. 553).

Legge records it from the Horton Plains, but I have no notes of it.

128. *PARUS ATRICEPS* (Legge, B. of C. p. 557).

A common hill species, found from 2500 feet up to the Horton Plains (7000 feet). It is frequently to be found in the gardens of up-country plantations, and by its bright colour and active movements this Titmouse may be very readily distinguished.

It breeds about the beginning of the S.W. monsoon, selecting holes in old trees and sometimes in houses. The nest is beautifully lined with feathers, hair, or cotton, and usually contains four eggs; these are pure chalk-white, finely dotted with purplish-red spots, that are more closely scattered over the broad end.

129. *DENDROPHILA FRONTALIS* (Legge, B. of C. p. 560).

This little Nuthatch has a very wide distribution in Sabaragamuwa. It frequents the forests of both dry and wet zones,

from the lowest to the highest altitudes. It is generally found in small companies of from five to a dozen birds, and in its habits is strikingly tame and fearless. I have not obtained either nest or eggs.

130. *CINNYRIS LOTENIUS* (Legge, B. of C. p. 563).

This beautiful Sun-bird is fairly abundant in the lower parts of the province up to 2500 feet. It is common in both the dry parts as well as the wet, as I have found it abundantly at Embilipitiyé, where the rainfall is very low, and at Ratnapura, where the opposite state of climate exists. It builds its beautiful nests at the ends of long thin branches, generally close to the ground, and sometimes over water, covering the outside with spider-webs and bits of thin bark. The eggs are usually three in number, of a dull grey ground-colour, closely freckled and spotted with brownish-grey and pepper-brown spots, often confluent at the broad end.

131. *CINNYRIS ASIATICUS* (Legge, B. of C. p. 566).

A bird of rather local distribution, though it may be found at many widely different altitudes. I have noticed it abundant at Kittulgalla, in the wettest parts of the province, and at Balangoda up to Galagama. It breeds in the province in April and May, constructing its pendulous nest much in the same way as the last-named species. The eggs are often three in number, of a pale greenish-white ground-colour, finely dotted and spotted with brown.

132. *CINNYRIS ZEYLONICUS* (Legge, B. of C. p. 569).

A very abundant species, and much more generally distributed than *C. asiaticus*. It is a common visitor to the gardens of Europeans, both in the hill-country and the lower parts of the province, and is perhaps better known by the incorrect title of the "Humming-bird."

Breeds freely during the north-east monsoon up to the middle of the year. The eggs are usually two in number, and the nest is of the pendulous character of the preceding species.

133. *DICÆUM MINIMUM* (Legge, B. of C. p. 574).

A widely-distributed little bird, but, if anything, it is

more abundant in the low country than at the highest altitudes. It is perhaps the chief means of distributing and spreading the growth of our local *Loranthus*, as it feeds on the berries, and deposits the sticky seeds on any branches it may for the moment perch upon.

I have obtained the nests in one of the wettest parts of the province during August, with two eggs. The nest itself is cup-shaped, and very beautifully built in the angle formed by two twigs. The eggs are pure white and faintly dotted over with minute brown dots.

134. *PACHYGLOSSA VINCENS* (Legge, B. of C. p. 577, pl. xxvi. figs. 1, 2).

This endemic species appears to be more or less confined to the wet forests and places where the rainfall is usually high, thus I have obtained it in Kittulgalla (rainfall 230 inches), Balangoda, the Kukulū Korah, and on the confines of the Galle district, but nowhere have I found it in abundance.

I know nothing of its nidification.

135. *ZOSTEROPS PALPEBROSA* (Legge, B. of C. p. 582).

Very common up to 2500 feet, after which it is scarcely seen. It appears to follow the damp parts of the province closely, as directly the intermediate rainfall district is passed and the dry zone is reached it becomes very scarce.

It nests in the S.W. monsoon months. The eggs are two, and sometimes three, in number, pale greenish blue, delicate in structure, and easily broken.

136. *ZOSTEROPS CEYLONENSIS* (Legge, B. of C. p. 585, pl. xxvi. fig. 3).

This species appears to begin exactly where the last-mentioned leaves off, in the hill-country. There it is found from 2500 feet to the top of the highest hills, and apparently with equal abundance. In the cold wet forests at the base of the cone of Adam's Peak this little bird's note is often the only sound to be heard, as the bleakness of the hills at this altitude drives back most bird-life to the warmer valleys under 5000 feet.

It breeds in the early part of the year, generally about

March and April. The nest is a beautiful structure, composed of fine mosses and thin roots. The eggs are pale blue and three in number.

137. *HIRUNDO RUSTICA* (Legge, B. of C. p. 587).

A migratory species, arriving in September and becoming exceedingly abundant soon after arrival, departing late in March and up sometimes as far as the middle of April. During the course of the arrival-period birds in all stages of dress will be found, from the most perfect bluish black to a faded brown-black. I know of no instance of the bird breeding in the island.

138. *HIRUNDO HYPERYTHRA* (Legge, B. of C. p. 592, pl. xxvii. fig. 1).

Very abundant in all the moist parts of the province from 100 feet to 3000, but rarely found above that altitude. It is particularly abundant in the Ratnapura country and all through the Kegalla district, and especially at Ambepussa, where it was first discovered nearly 50 years ago by Layard.

I have repeatedly found its nests both in caves as well as in dwellings, one of the last instances I noted being a nest built in the Government Agent's Residency at Ratnapura. The eggs are pure white and nearly always two in number. Endemic.

139. *HIRUNDO JAVANICA* (Legge, B. of C. p. 597).

Chiefly confined to the high hills from 2000 feet and upwards, where it becomes very common and is generally known to the Europeans as the "Bungalow Swallow," owing to its frequently nesting in houses. I have for some years watched the nidification of this interesting species, and have found that a pair will not only return to the same nest for a second breeding-season, but will repeat the operation more than twice, so long as the nest is not damaged. I would call attention to a remarkable instance of intelligence in animals that I recorded in 'Nature' (22nd July, 1886, p. 265), in which a pair of these Swallows constructed a nest on the top of a hanging lamp. The intelligence was displayed by their placing their dome-like structure over the pulleys by

which the lamp was raised or depressed for lighting purposes, so that the chains could travel over the enclosed wheels without damage to the nest itself! I might further add that, notwithstanding that the lamp was in nightly use, the young birds were successfully reared, after which the nest was removed, owing to the inconvenience occasioned by its occupants.

The building-season is generally from April to June, the birds laying three broad eggs of a pale white colour, closely spotted over with warm brown or reddish-brown spots and blotches.

140. *PASSER DOMESTICUS* (Legge, B. of C. p. 600).

Abundant all through the province where there are human habitations. It is known to the natives of the country as the "Gewal kooroola," or *house-bird*, and equally the Tamils from South India, who form the chief labouring class of the island, call our Sparrow "Ootoo koorovic," or *home-bird*.

I am unable to assign any particular season as the breeding-season, and I am equally unable to give a typical example of the colouring of egg.

141. *MOTACILLA MELANOPE* (Legge, B. of C. p. 610).

A typical migrant to the country during the north-east monsoon. For years I have noted the arrival of this species to take place within the first ten days of September, and during the time of its stay its distribution extends from the lowest to the highest parts of the province. I have found it by the side of some stagnant pool in the wilds of the dry zone, and again following some little stream in the solemn cold forests in the Adam's Peak wilderness. At the time of its departure I have two or three times found a large party of these active little Wagtails congregating on the roof of a house or in the branches of some solitary tree, but their departure, which is in March and up to the beginning of April, is much more gradual than the arrival.

I have not taken the nest, and am unable to record any instance of local nidification.

142. *LIMONIDROMUS INDICUS* (Legge, B. of C. p. 614).

This little Wagtail, like the preceding, is a north-east monsoon visitor to Ceylon. It arrives in October and sometimes later, and is distributed sparingly; thus it is rare above 3000 feet altitude, but is about equally plentiful at the foot of the main hill-ranges to the eastward. It is frequently met with in the driest parts of the dry zone, in dense forest, quite irrespective of the neighbourhood of water or moisture, but in these places I have not procured it in the open bush-land. I know nothing of its nidification.

143. *BUDYTES VIRIDIS* (Legge, B. of C. p. 617).

A north-east migrant, arriving in the province towards the end of September, and confined to the dry zone on the east. I have found it in the greatest abundance at Embilipitiyé, where that portion of the tank is silted up and affords a sort of meadow, and in all like situations. I can give no particulars of its nidification.

144. *CORYDALLA RUFULA* (Legge, B. of C. p. 625).

A common resident species and widely distributed. More abundant on patina-lands, from which it has been called the "Patina Lark."

It breeds at the beginning of the S.W. monsoon, selecting the ground or some small tuft of grass for its place of nesting. The eggs are three in number, dull brownish stone-colour, blotched over with broad markings of red-brown or dull chocolate-brown.

145. *ALAUDA GULGULA* (Legge, B. of C. p. 630).

I include this species with some hesitation, as I have met with it only on the confines of the province on the south-east.

146. *PYRRHULAUDA GRISEA* (Legge, B. of C. p. 637).

I have only once met with this little Lark, when I found a small flock of them in the very driest part of the province towards Hambantotta.

147. *PLOCEUS PHILIPPINUS* (Legge, B. of C. p. 641).

A very common low-country species, frequenting more

particularly the dry parts of the province. It has, since 1879, advanced its distribution in the province. In the year I refer to these Weaver-birds were not known as nesting to the west of Balangoda, but are now to be found several miles to the west of this point and at 2500 feet altitude. They breed from the end of April through the S.W. monsoon, selecting solitary fields, generally in the neighbourhood of rice-fields. The eggs are three, and often four, in number, of a pure white colour.

148. *MUNIA KELAARTI* (Legge, B. of C. p. 650, pl. xxvii. fig. 2).

A very abundant little bird above 1500 feet, below which I have not often met with it, but it might readily be overlooked among many of the Bunting tribe in the province.

It breeds in the S.W. monsoon, often constructing its nest in fruit-trees on the tea-estates in the hills. The eggs are pure white, and rather pointed in shape. I have found as many as four eggs in one nest, but the usual number is two. Endemic.

149. *MUNIA MALACCA* (Legge, B. of C. p. 652).

This bird has a curious distribution in the province. I have, as recorded by Legge, found it in the Wallaway valley and in the tank-country towards the foot of the hills. Again, I have obtained it in the grass-lands at Gallagama and up as high as the Horton Plains. I have no authentic instance of its nidification in the province.

150. *MUNIA PUNCTULATA* (Legge, B. of C. p. 656).

The Spotted Bunting is very generally distributed through the lower parts of the province. In the Kegalla district it is more abundant towards the foot of the Kandyan hills, where it frequents paddy- (rice-) fields in flocks. It breeds nearly all the year round, selecting for the purpose solitary trees that are more or less densely branched. The eggs are generally four in number.

151. *MUNIA STRIATA* (Legge, B. of C. p. 660).

I have found this bird in fair abundance throughout the

province, except in the very dry and very wet districts. It breeds at 3000 feet, often selecting orange-trees for the spot in which its nest is to be built. I have taken four eggs at a time, and in the Central Province I have found it laying six eggs.

152. *MUNIA MALABARICA* (Legge, B. of C. p. 662).

Occasionally found in the province, but more towards the confines of the dry zone to the north-east and towards the foot of the Kandyan hills. I have found no eggs.

153. *ARTAMUS FUSCUS* (Legge, B. of C. p. 666).

One of the commonest birds, but chiefly confined to altitudes of 2000 feet and downward. It prefers open country, and particularly rice-fields, where its manner of taking its prey on the wing is probably the cause of its being called by the same name as the Swift and Swallow by the natives. It is a resident species.

154. *ACRIDOTHERES MELANOSTERNUS* (Legge, B. of C. p. 670).

Widely distributed up to 4000 feet elevation, and a favourite cage-bird with both natives and Europeans.

Breeds early in the year, following to a great extent the manner of the Woodpeckers in its nesting-habits. The eggs are generally three in number, nearly an inch in length, and of a most beautiful pale blue colour, quite free from any spots or blotches, but not always clean. Endemic (*Legge*)? A series of adult birds from both wet and dry districts indicate variation in colour to a considerable extent, those from the wet Kittulgalla district being two or three shades darker than examples from the Kolouna Korah, our driest division.

155. *STURNORNIS SENEX* (Legge, B. of C. p. 680, pl. xxviii.).

This rare Starling is strictly a forest species. I have found it in Balangoda, Bamberabolowa, and Eratue, all three wet districts at the foot of the main mountain-zone. This species, like the foregoing, is gregarious in its habits,

but the flocks of birds rarely exceed ten or a dozen in number.

I am indebted to Mr. George W. Jenkins for having obtained the eggs of *Sturnornis senex*. The nest was placed in a tall forest-tree, in a rotten cavity of the stem, and rudely lined with dry leaves of some monocotyledonous plant. The eggs were two in number and of a pale, delicate, spotless blue colour. Endemic.

156. *EULABES RELIGIOSA* (Legge, B. of C. p. 682).

A curiously-distributed Mynah, and chiefly restricted to the wet districts. I have met with it in all the region at the foot of the main hill-range from Kittulgalla to Balangoda, thus embracing the wettest part of Ceylon, but for some remarkable reason it is absent in parts of the Kukul Korah, where the rainfall is distressingly excessive. I have traced it on the borders of the dry country on the north-west and south-west extremes of the province, where it is abundant.

I have not obtained the eggs, though nests have been repeatedly pointed out to me by the natives, who are fond of caging this bird.

157. *EULABES PTILOGENYS* (Legge, B. of C. p. 685, pl. xxix.).

This Mynah appears to take the place in the hill-country that *E. religiosa* does in the lower altitudes. It is widely distributed, and to be found nearly all over the wet districts of the province, but more abundantly in the hills. It breeds in the S.W. monsoon months, placing its nest in hollows of rotten trees. The eggs are two in number, broad oval, and of a pale blue colour faintly tinted with a greenish shade, with spots or blotches sparingly spattered over, of a greyish-brown tint. Endemic.

158. *PITTA CORONATA* (Legge, B. of C. p. 687).

A typical migrant, arriving in September soon after the Wagtails. During its visit to the country it is to be found in abundance up to 3000 feet altitude, and is so familiar to the natives as to enjoy a specific name. It is frequently snared by the Singalese, but cannot be reared in captivity.

COLUMBÆ.

159. *PALUMBUS TORRINGTONIÆ* (Legge, B. of C. p. 693, pl. xxx.).

Locally distributed in Sabaragamuwa, and chiefly confined to the hills, though not uncommon in the neighbourhood of the dry zone when certain laurels are in fruit, these magnificent Pigeons then becoming suddenly abundant. Though an endemic species, I have never obtained the eggs.

160. *TURTUR SURATENSIS* (Legge, B. of C. p. 705).

The commonest Dove of the country, and to be found in both wet and dry districts up to 3000 feet. The "Alu-Korbeyo" of the Singalese form quite a feature of the bird-life of the rice-fields, more especially in the dry districts, where at the end of the rice-harvest they may be found in thousands. The breeding-season is from the end of February, but it is not unusual to find nests in December. The nest is of the crudest construction and placed in any situation, from a low bush to a depression on the bough of a tree. The eggs are two in number, pure white and very glossy.

161. *CHALCOPHAPS INDICA* (Legge, B. of C. p. 714).

The Bronze-winged Dove is perhaps the best known of the Ceylonese Columbæ. It is to be found in all the wet forest-lands of the province right down to the borders of the dry zone and up to the Horton Plains, but at high altitudes it is not so plentiful. I am uncertain as to the correct breeding-season of the species, as I have found it nesting in both monsoons. The eggs are two in number and pure white in colour.

162. *CARPOPHAGA ÆNEA* (Legge, B. of C. p. 718).

This splendid Fruit-Pigeon has a curious distribution in the Sabaragamuwa Province, as it is found in both the very wet as well as in very dry parts of it. I have found it up the valley of Kaluganga river, the Wallaway river, the Kalani river, and the Maha Oya stream, but it is met with in greatest abundance in the Kolonna Korah, where it is often to be found in large flocks. I have questioned many natives

on the nidification of this well-known Pigeon, but beyond a vague statement that it nests on the tops of very high trees, I am unable to give any satisfactory evidence.

163. *OSMOTRERON BICINCTA* (Legge, B. of C. p. 725).

Confined to the south-eastern part of the province, where I have found it only sparingly. I came upon it in abundance on the banks of the Wallaway river at Ridiyagama, but not to the northward.

164. *OSMOTRERON POMPADORA* (Legge, B. of C. p. 728).

The common "Green Pigeon" of the country. It is common all over the province up to 2500 feet.

I obtained a single nest taken in the Gillimali valley, but the young had been hatched. The nest was particularly small for so large a bird, and lined with soft spongy moss.

GALLINÆ.

165. *PAVO CRISTATUS* (Legge, B. of C. p. 731).

The Peacock—the "Monara" of the Singalese—is purely a dry-country bird in the province. In the Kukul Korah it is said by the natives to have at one time been common, and up to 1893 I know a solitary male bird to have lived in one of the forests within the wet-zone area, but I am not able to record evidence of distribution outside the dry belt adjoining the Southern Province. I have not taken the eggs myself, but have repeatedly seen chicks that had been captured by the natives.

166. *GALLUS LAFAYETTI* (Legge, B. of C. p. 736, pls. xxxi. & xxxii.).

This magnificent bird is known all over the province in both wet and dry zones, but is more abundant in the latter than in the former areas, as a general rule. During the period when the "Nillo"—a *Strobilanthus*—is in seed the Jungle-fowls become very abundant, and hundreds of them are shot down in the hill-country. In one district I can remember seeing the Jungle-fowls being put up right out in the middle of the estates and away from forest.

The question of the crossing of this species with the

domestic fowl is undoubted, as I have myself seen a splendid hybrid cock bird, but, owing to his extreme pugnacity, I obtained no satisfactory proof of further offspring being attributed to him. According to native testimony, the Jungle-fowl in the villages adjoining the wild forests freely mix with the domestic birds.

The breeding-season cannot, I think, be confined to any particular time, as I have taken the eggs in both monsoons, and on one occasion I took as many as six from a single nest. The colour is a soft brownish stone, and in some faintly pinkish, finely marked with dots and spots of brown. Endemic.

167. GALLOPERDIX BICALCARATA (Legge, B. of C. p. 741, pl. xxxiii.).

This handsome "Partridge" is very generally distributed over the entire province wherever there is bush or forest cover. It is an exceedingly shy bird, and therefore far more frequently heard than seen, as it very rarely ventures into the open and runs the moment it is alarmed.

It breeds during the latter part of the north-east monsoon and well into the opposite one. The eggs are laid on the bare ground, usually by the side of some fallen tree or other like cover, and are from two to four in number (I have often taken four), of a fine cream-colour, with white specks of no very uniform distribution over the surface. The species is confined to Ceylon.

XLVI.—*A List of the Birds collected by Mr. Alfred Sharpe, C.B., in Nyasaland.* By Captain G. E. SHELLEY, F.Z.S. With Prefatory Remarks by P. L. SCLATER, M.A., Ph.D., F.R.S.

I. INTRODUCTION. By P. L. S.

ON succeeding to the Governorship of the Protectorate of Nyasaland, Mr. Alfred Sharpe resolved to continue the scientific investigations so long and so successfully carried on by Sir Harry Johnston, his predecessor in office, and